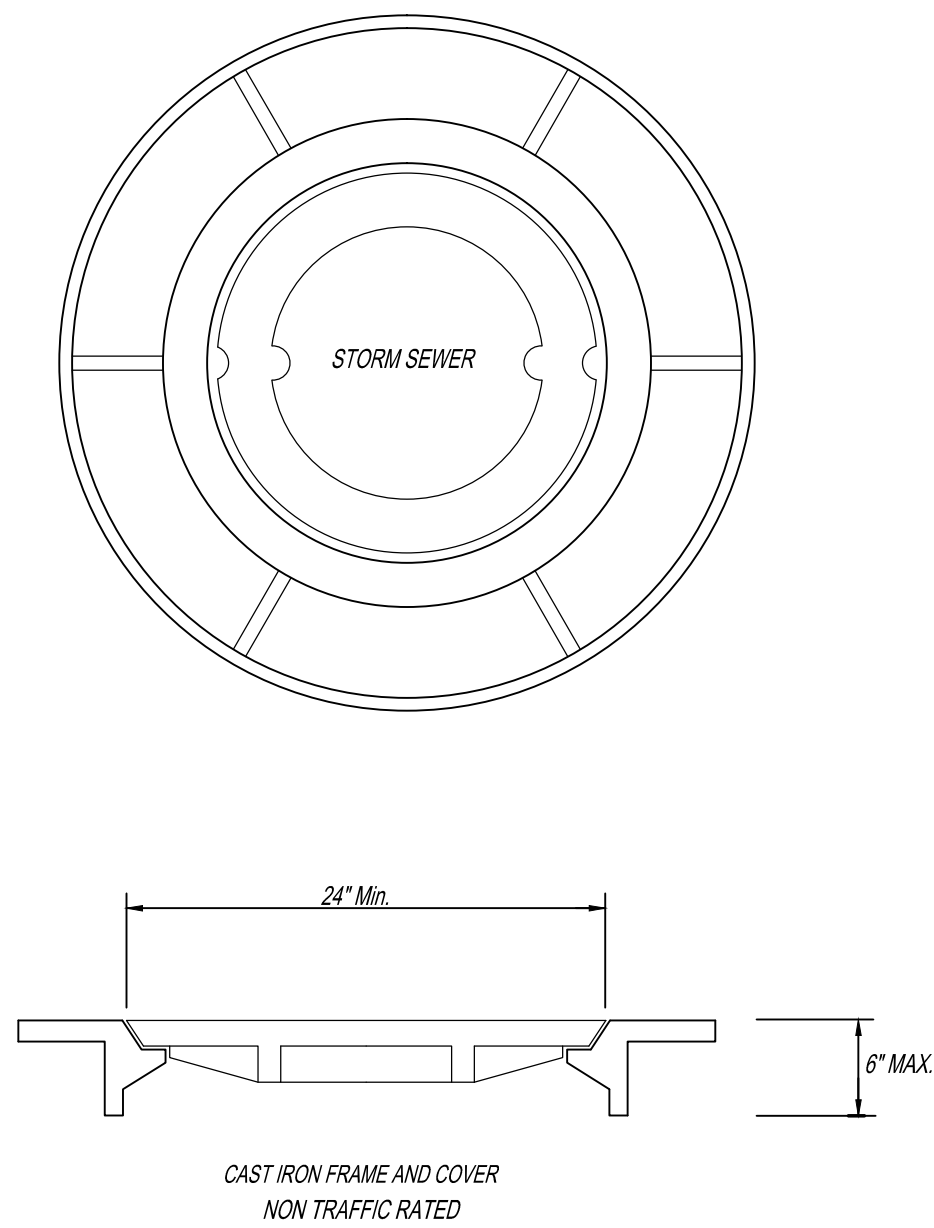
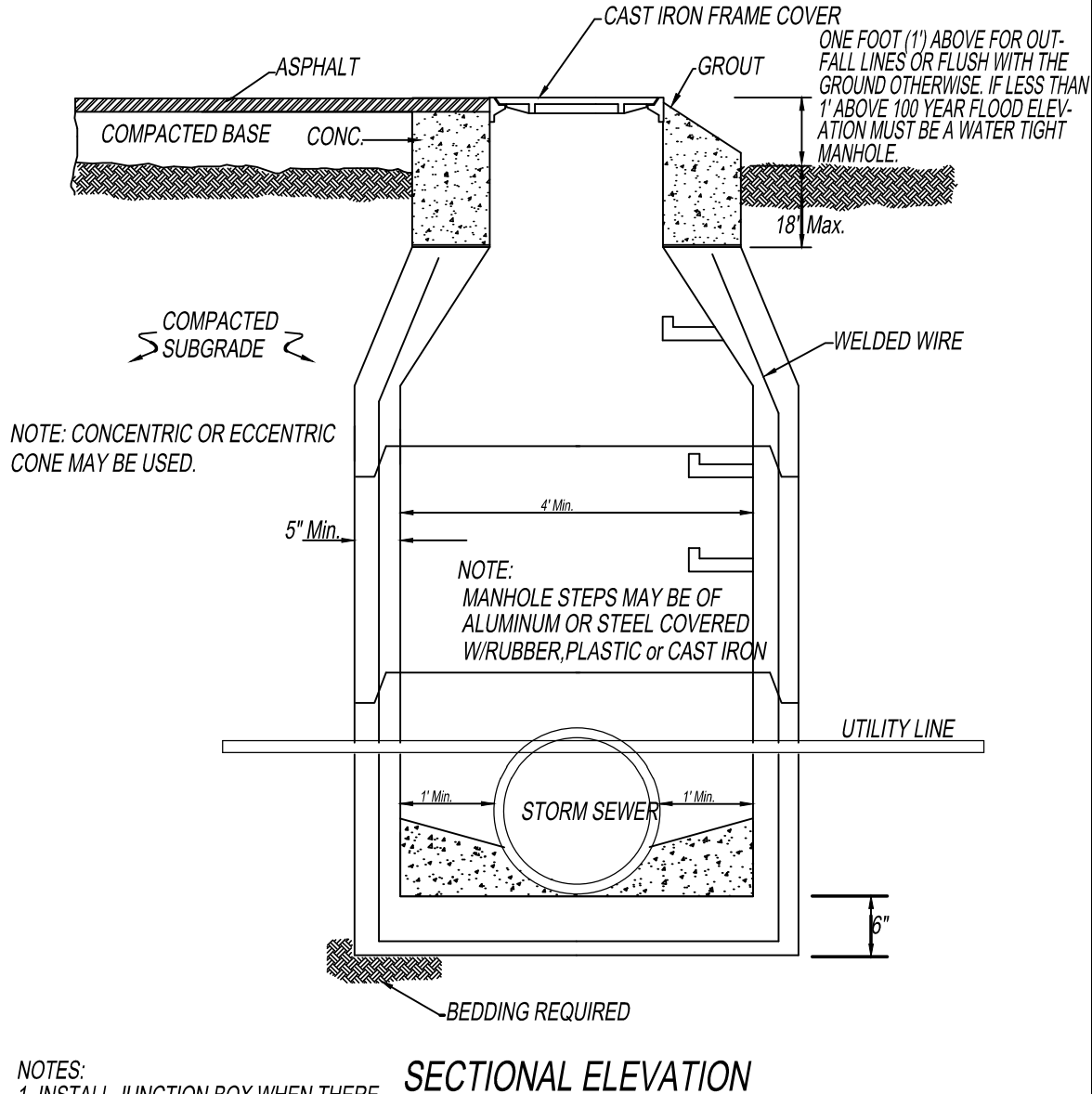


CAST IRON RING AND COVER DETAIL



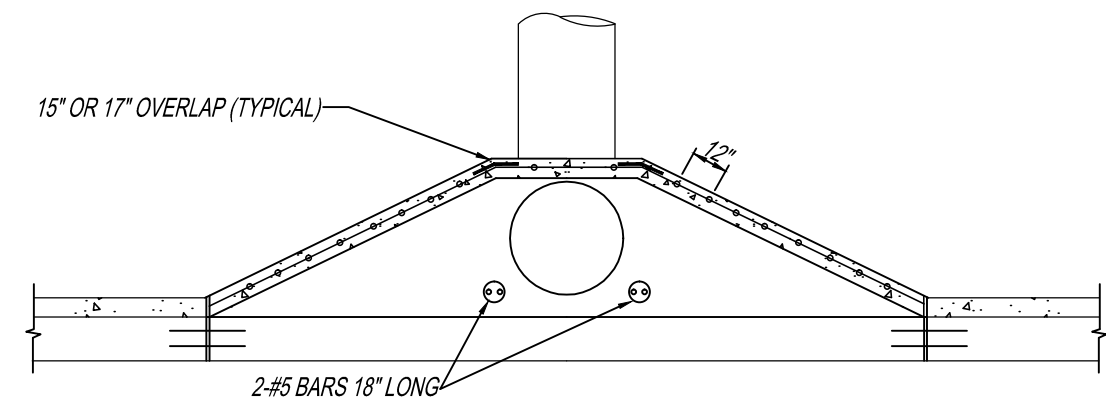
UTILITY CONFLICT MANHOLE



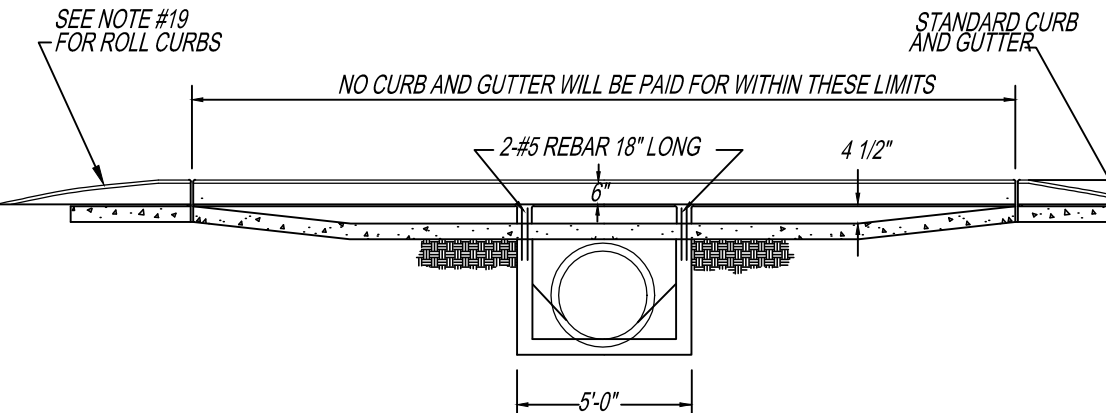
SECTIONAL ELEVATION

NOTES:  
1. INSTALL JUNCTION BOX WHEN THERE IS A CONFLICT BETWEEN STORM SEWER AND OTHER UTILITY LINES.  
2. IF THE CONFLICTING UTILITY LINE IS A SANITARY SEWER LINE, REPLACE THE V.C. OR PVC PIPE WITH DUCTILE IRON PIPE.  
3. IF POSSIBLE, INSTALL THE CONFLICTING UTILITY IN THE UPPER 1/3 OF THE STORM SEWER.

DOUBLE WING INLET

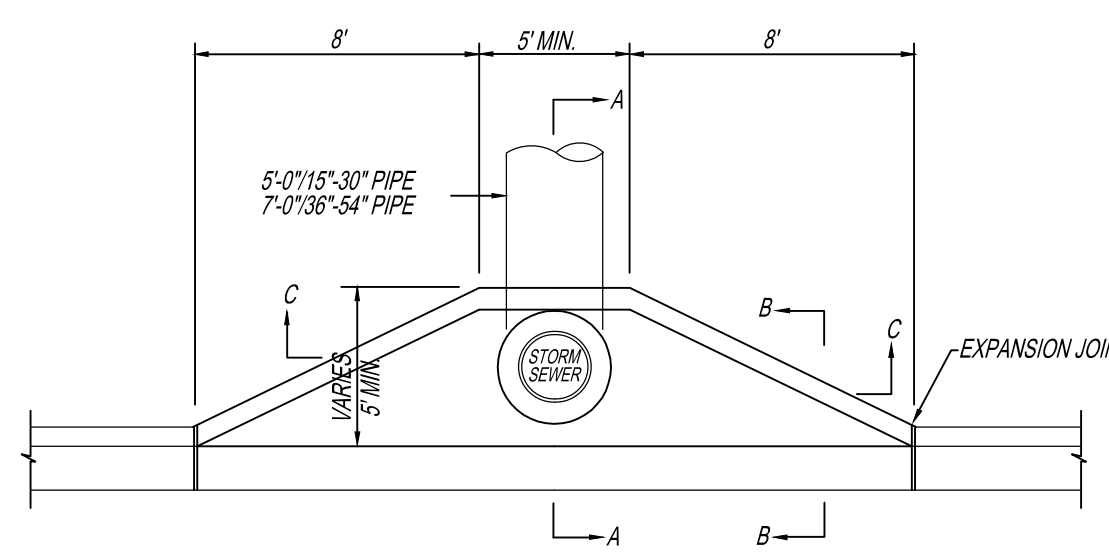


DOUBLE WING INLET SLAB SECTION

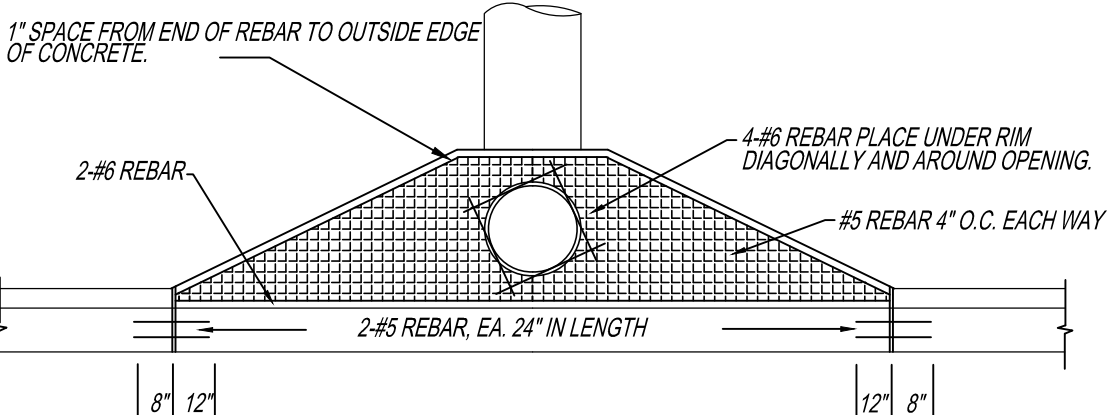


DOUBLE WING INLET ELEVATION

DOUBLE WING INLET

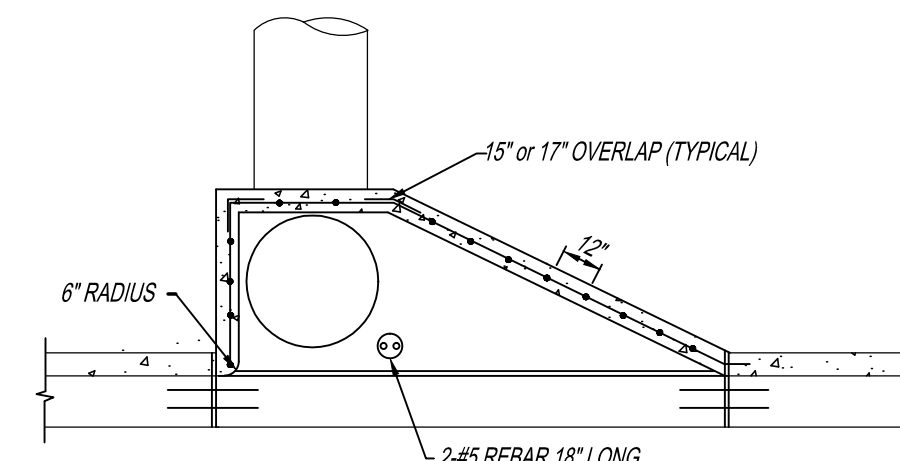


DOUBLE WING INLET PLAN

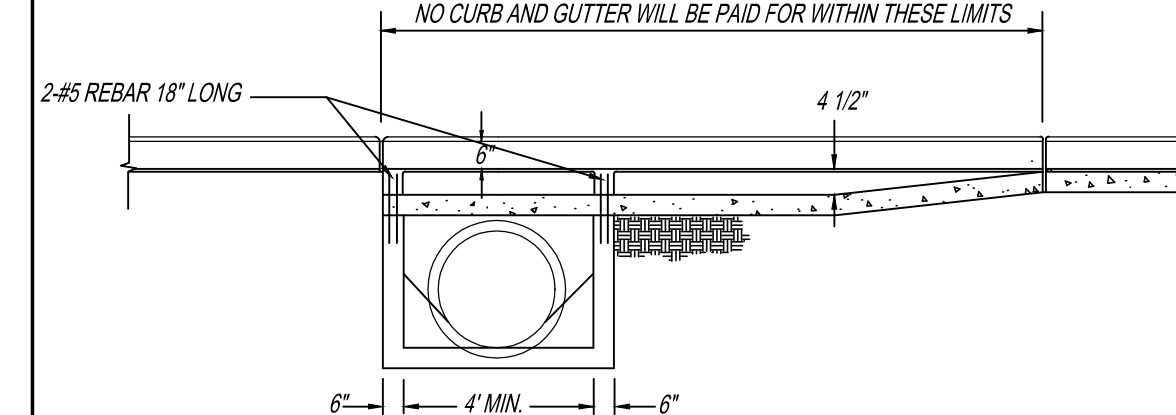


DOUBLE WING INLET TOP SECTION

SINGLE WING INLET

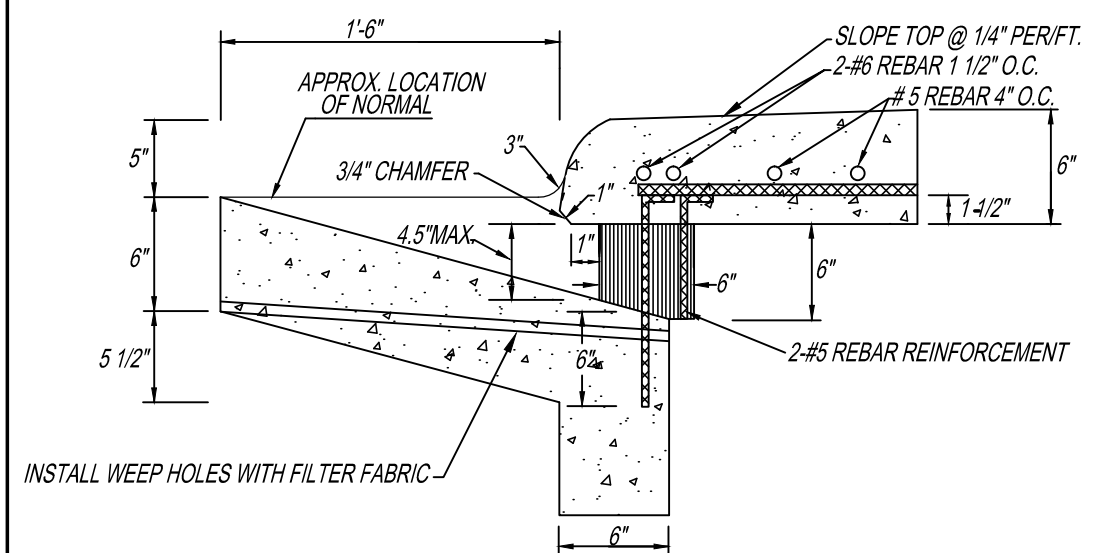


SINGLE WING INLET SLAB SECTION

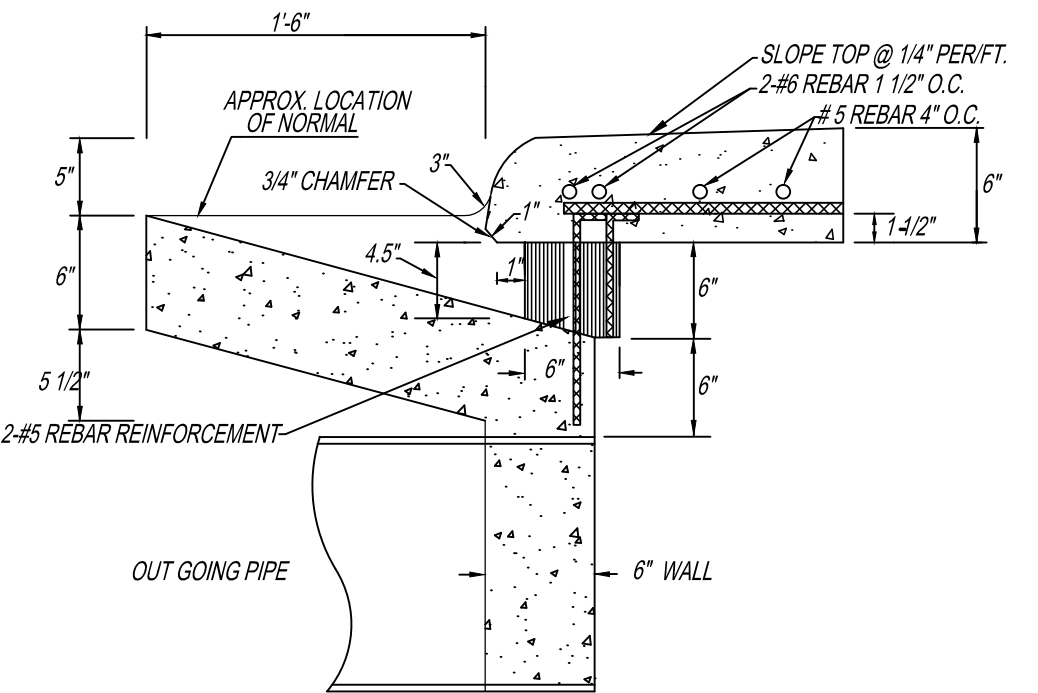


SINGLE WING INLET ELEVATION

DEPRESSED GUTTER DETAIL #1 & #2

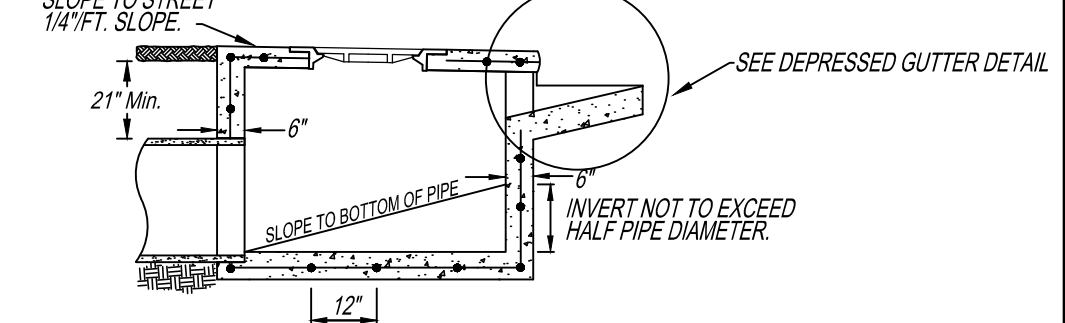


DEPRESSED GUTTER DETAIL #1

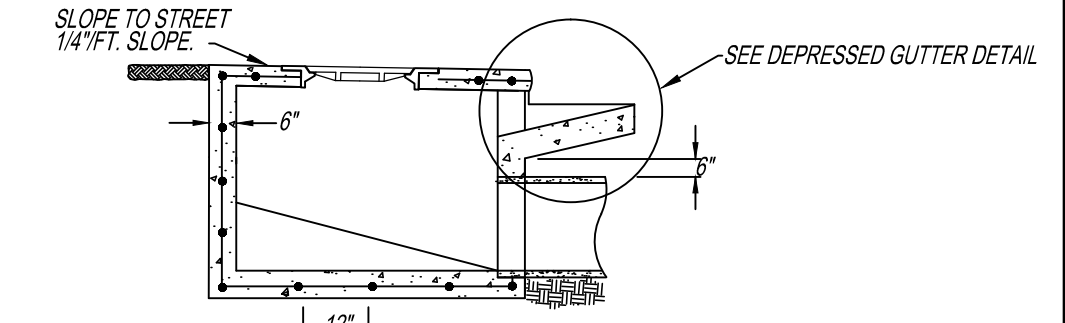


DEPRESSED GUTTER DETAIL #2

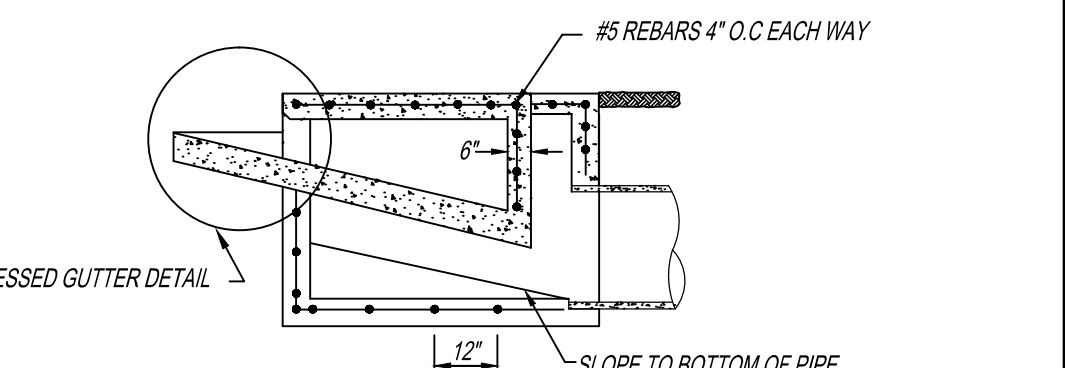
INLET BOX DETAIL AA #1, #2 & DETAIL BB



INLET BOX DETAIL AA (#1)

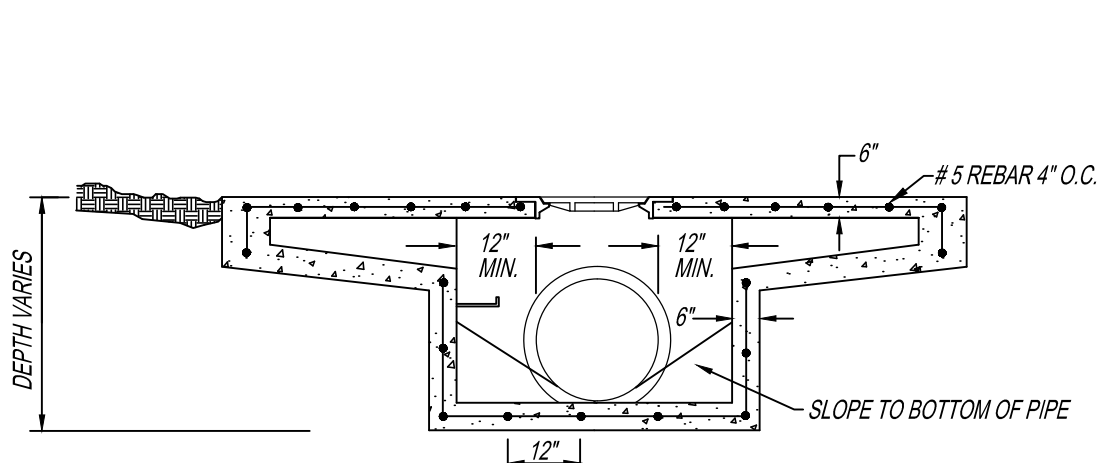


INLET BOX DETAIL AA (#2)

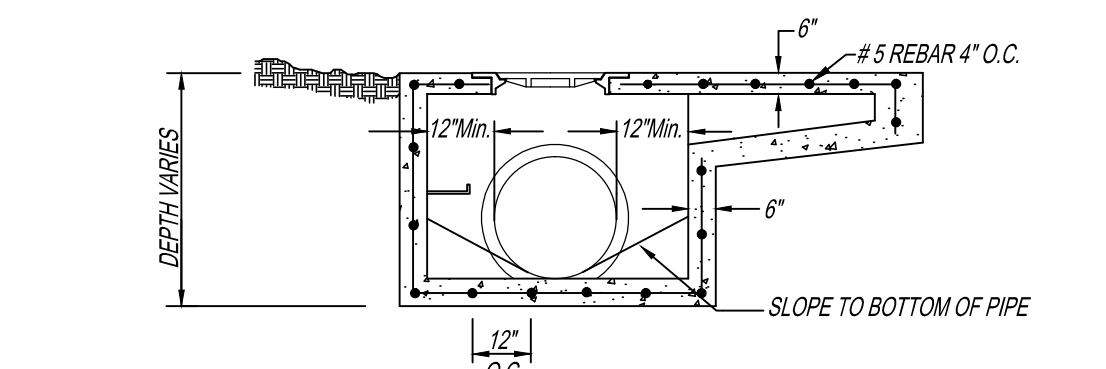


INLET BOX DETAIL BB

DOUBLE WING INLET

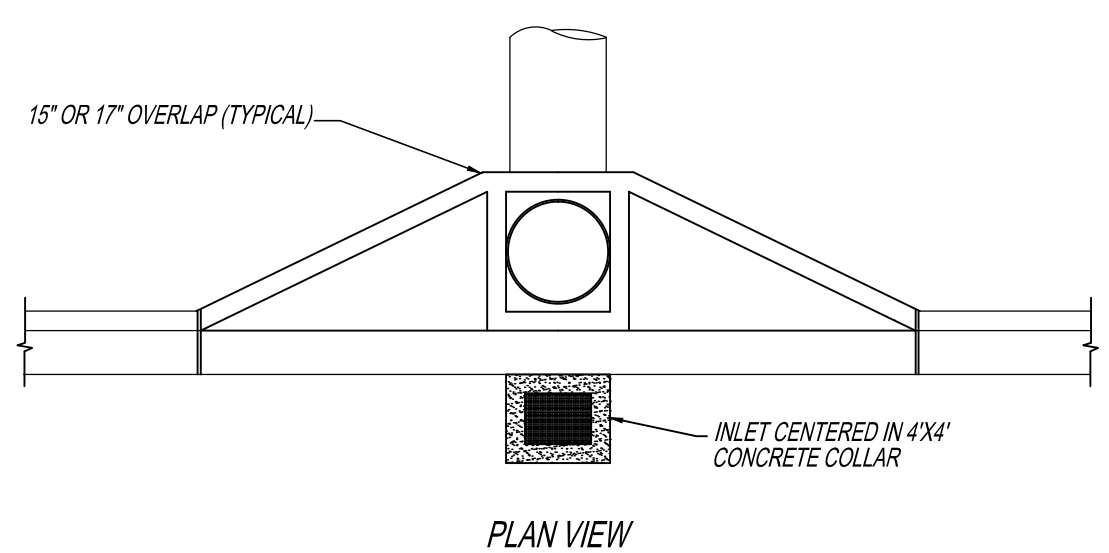


DOUBLE WING INLET DETAIL CC

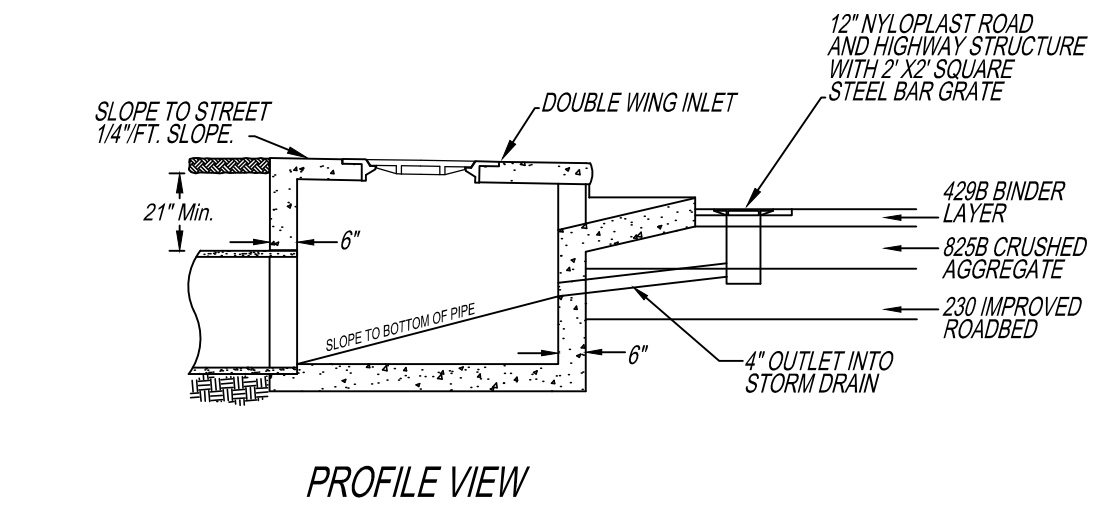


SINGLE WING INLET DETAIL DD

DOUBLE WING INLET



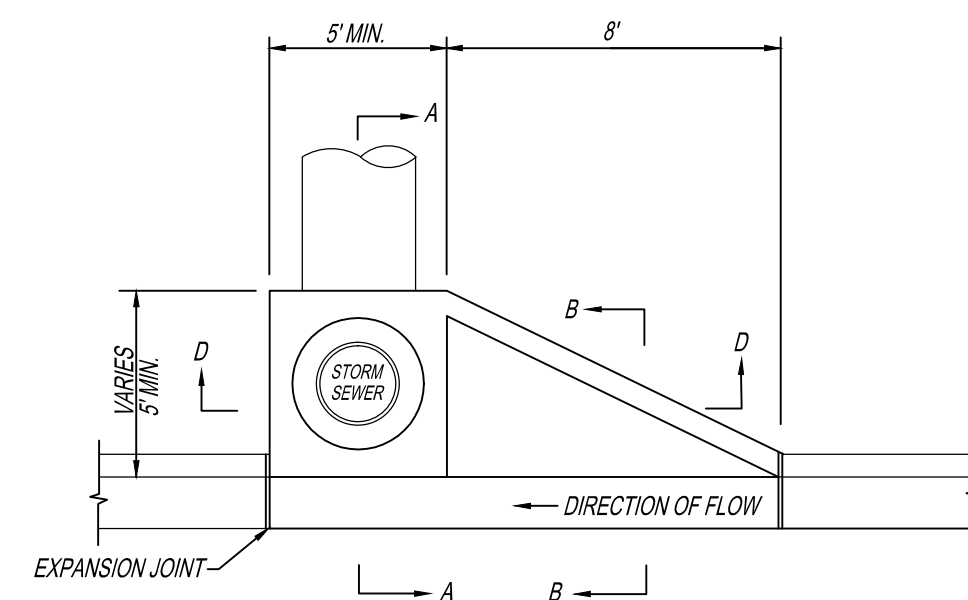
PLAN VIEW



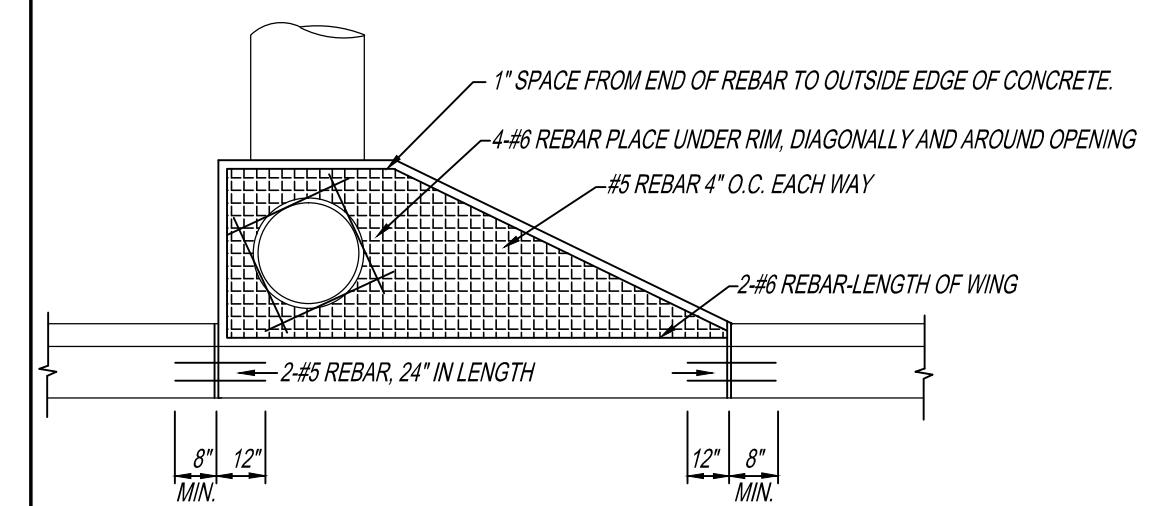
PROFILE VIEW

NOTE:  
THIS DETAIL SHALL BE USED AT THE SAC INLETS WHERE WEARING SURFACE WILL NOT BE PLACED AT THIS TIME.  
INLET SHALL BE PLACED AT LOWEST POINT IN THE ROADWAY.

SINGLE WING INLET



SINGLE WING INLET PLAN



SINGLE WING TOP SECTION

NOTES:

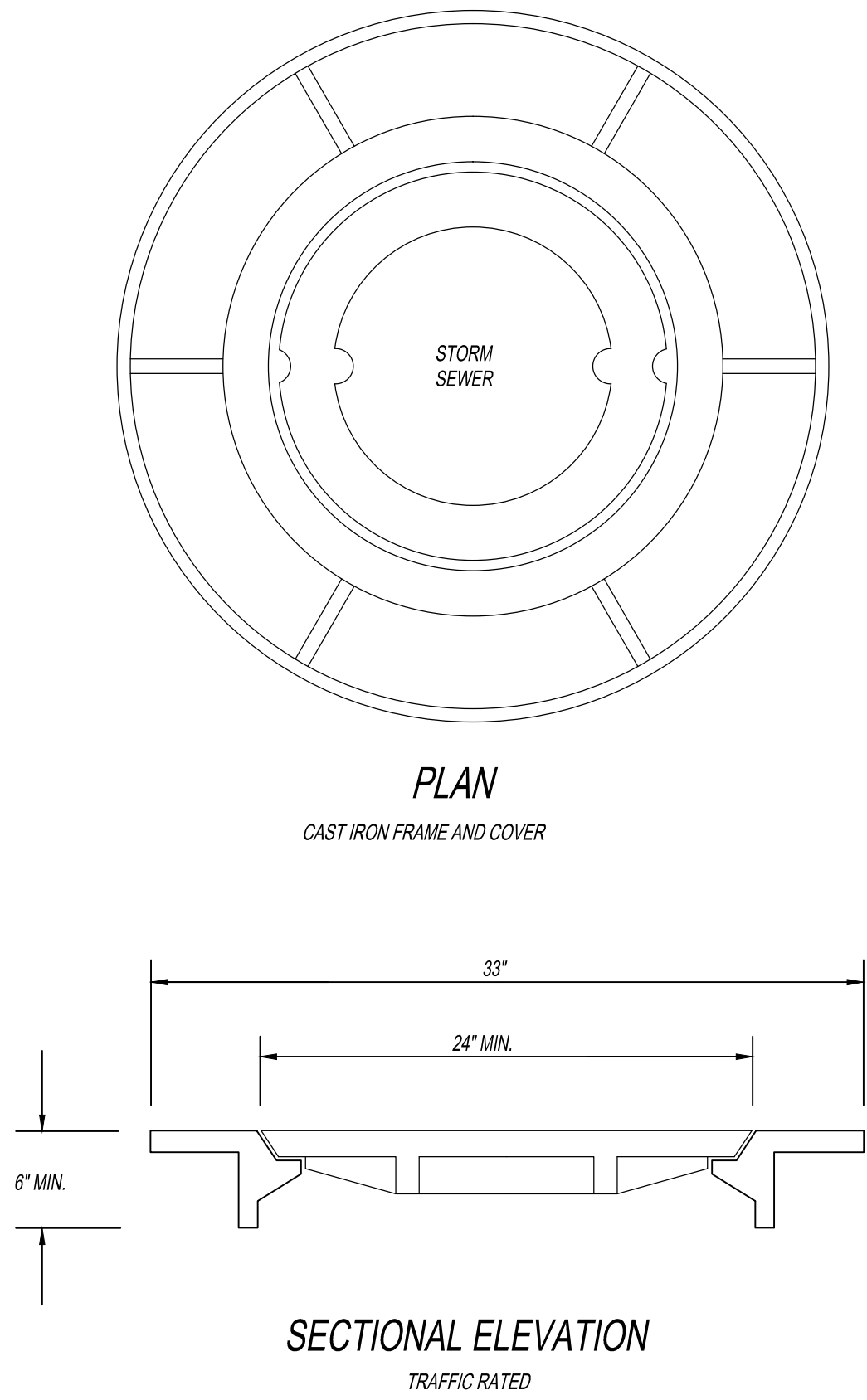
- HEADWALL AND WINGWALLS SHALL HAVE A RUBBED SMOOTH FINISH. PIPE SHALL BE CUT FLUSH WITH THE INSIDE FACE OF THE HEADWALL.
- JUNCTION BOX INVERTS SHALL BE SMOOTH AND APPROXIMATE THE CROSS SECTION OF THE PIPE USED. AT LEAST 2\"/>
- CAST IRON FRAME AND COVER SHALL WEIGH 375 POUNDS IN TRAFFIC AND 325 POUNDS OFF TRAFFIC.
- ALL PIPES SHALL BE LAID WITH ENDS ABUTTING AND TRUE TO LINE AND GRADE. PIPE SHALL BE FITTED AND MATCHED TO FORM A LINE WITH A SMOOTH UNIFORM INVERT. GROUT SHALL THEN BE APPLIED SMOOTHLY TO THE OUTSIDE TOP TWO THIRDS AND THE INSIDE BOTTOM ONE HALF TO WATER PROOF ALL PIPE.
- PRECAST MANHOLES MAY BE USED FOR PIPE UP TO 36\"/>
- FOR PIPE SIZES LARGER THAN 42\"/>
- INLETS SHALL NOT BE PLACED IN A RADIUS OF INTERSECTING STREETS OR DRIVES.
- PRECAST ITEMS MUST BE APPROVED PRIOR TO USE.
- CHAMFER STRIPS ARE REQUIRED ON ALL HEADWALL EDGES.
- RIPRAP IS REQUIRED AT ALL PIPE OUTLETS WITH GEOTEXTILE. THE SIZE OF THE PAD SHALL BE AS DESIGNED BY THE ENGINEER BUT SHALL BE CONSTRUCTED PER THE DETAIL.
- DISTANCE FROM RADIUS POINT TO EXISTING EXPANSION OR CONSTRUCTION JOINT SHALL BE AT LEAST 3.0\"/>
- MINIMUM INSIDE DIMENSION OF JUNCTION BOXES AND INLETS SHALL BE 4 FEET.
- TOP OF INLET SHALL BE THE SAME ELEVATION AS ADJOINING CURB AND GUTTER.
- 2\"/>
- IF INLETS ALSO SERVES AS A JUNCTION BOX, CONTOUR BOTTOM AS PER JUNCTION BOX REQUIREMENTS.
- MORTAR: A CONCRETE MIX EQUIVALENT TO AT LEAST A 3000 PSI STABILITY.
- NUMBER 5 REBAR SHALL BE INSTALLED INTO ALL CURB AND GUTTER COLD JOINT TIE INS. AT ALL INLETS & JUNCTION BOXES, OR TO BE DETERMINED BY THE PROJECT ENGINEER/PROJECT INSPECTOR.
- INSTALL CAST IRON STEPS IN JUNCTION BOXES OR INLET EVERY 16\"/>
- FOUR FOOT (4') MINIMUM TRANSITIONS FROM ROLL CURB TO STANDARD CURB AND GUTTER TO ALLOW STANDARD INLET TO BE CONSTRUCTION.
- INVERTS SHALL BE POURED CONCRETE. NO BRICK OR ROCKS SHALL BE USED AS FILLER MATERIAL.
- INVERTS SHALL NOT EXCEED HALF THE DIAMETER OF THE PIPE. NO FLAT AREAS ARE PERMITTED.
- INLET TOPS SHALL BE SLOPED AT 1/4\"/>
- CONCRETE USED FOR STORM STRUCTURES MUST HAVE A MINIMUM COMPRESSIVE STRENGTH OF 3000 psi.
- MODIFIED INLETS MUST HAVE SAME CARRYING CAPACITY AS STANDARD INLETS. DIMENSIONS/DETAILS MUST BE APPROVED BY CITY OF AUBURN ENGINEER PRIOR TO INSTALLATION.
- HDPPE CAN BE USED FROM RIGHT OF WAY OUT WITH CITY OF AUBURN APPROVAL.
- AN EXPANSION JOINT MUST BE PROVIDED AT THE INLET / CURB FACE.
- MECHANICAL TAMPING IS REQUIRED AROUND AND BEHIND INLETS.

STANDARD DETAILS: STORM SEWER SHEET NO 1 OF 3

PROJECT TITLE:	DEPARTMENT:	ENGINEERING	REVISIONS:
	SCALE:	NTS	L.W. - 6/25/98 BS: Jan. 2008
	DRAWN BY:	BRIAN SIMPSON	GM: 03-08-99 BS: Nov. 2007
	CITY ENGINEER:	JEFF RAMSEY	GM: 02-24-03 GM: 12/29/2010
	APPROV. BY:	JEFF RAMSEY	GM: 05-21-04
	IMPLEMENTED:	JANUARY 01, 2011	BS: 10-05-04

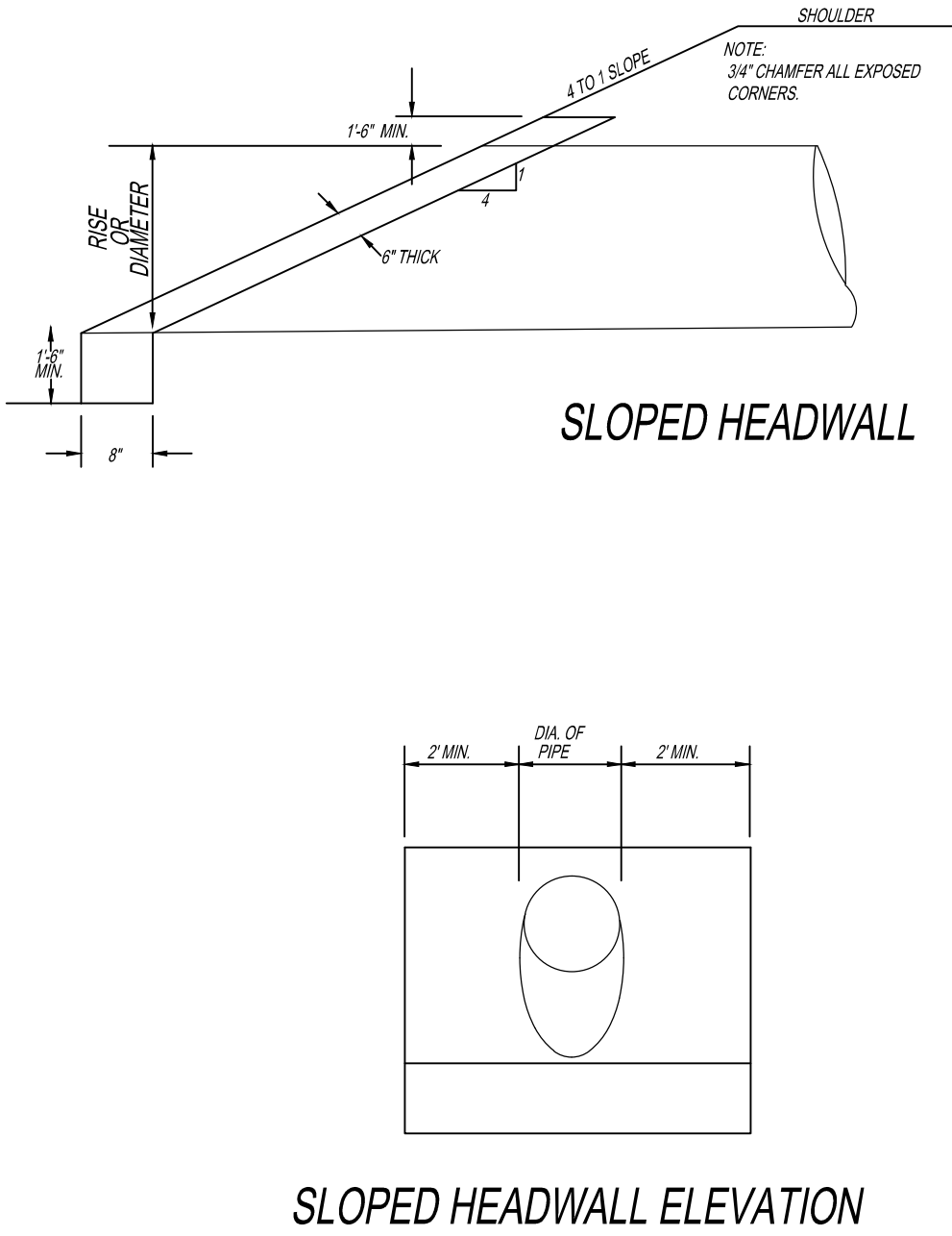


CAST IRON FRAME AND COVER DETAIL



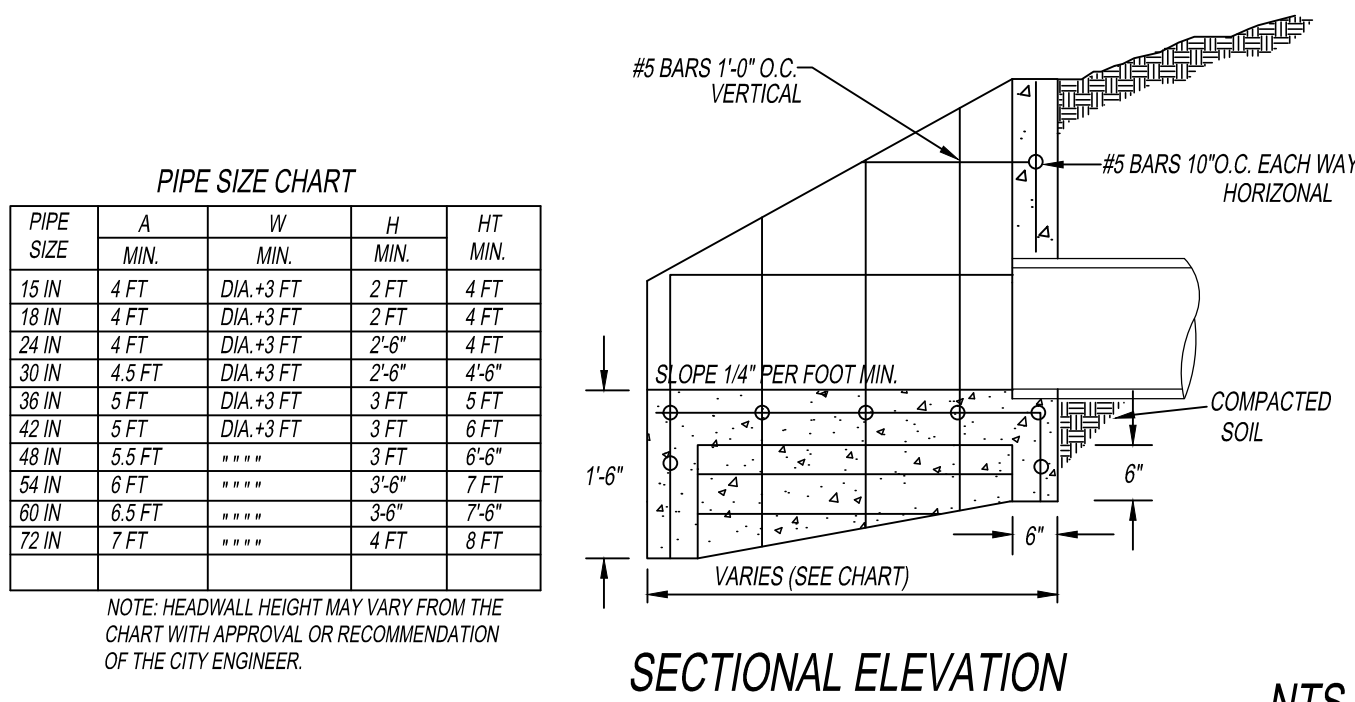
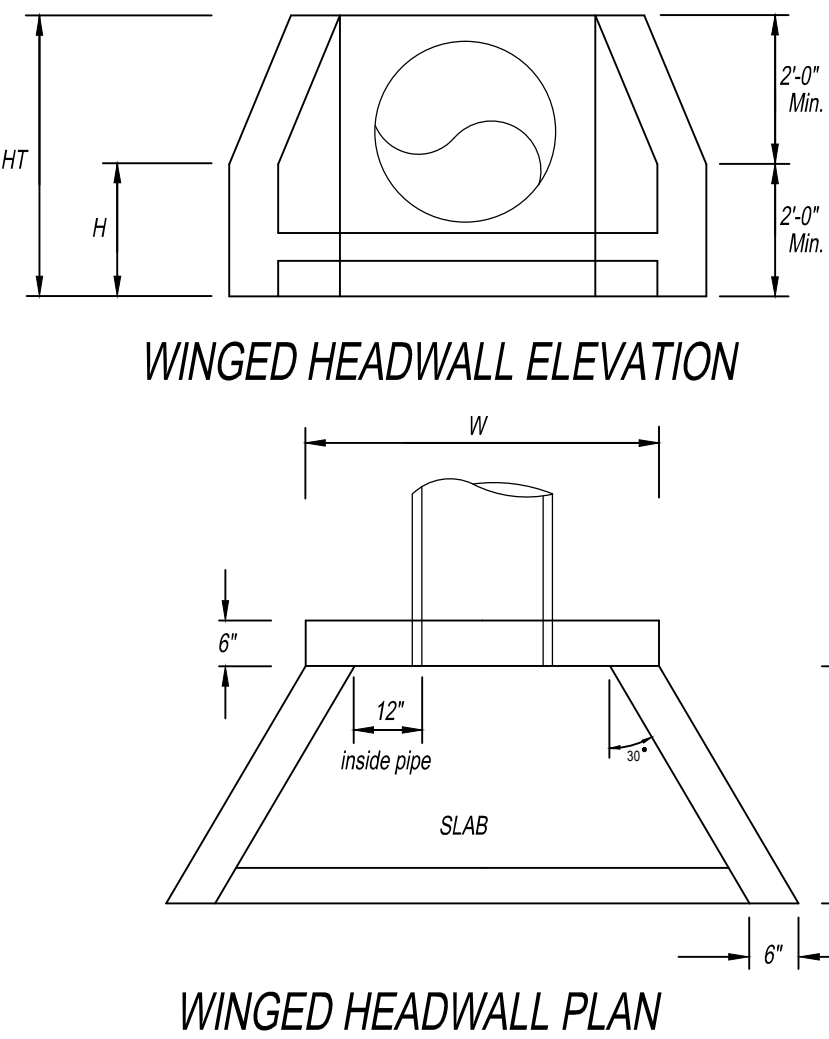
NTS

SLOPED HEADWALL DETAIL



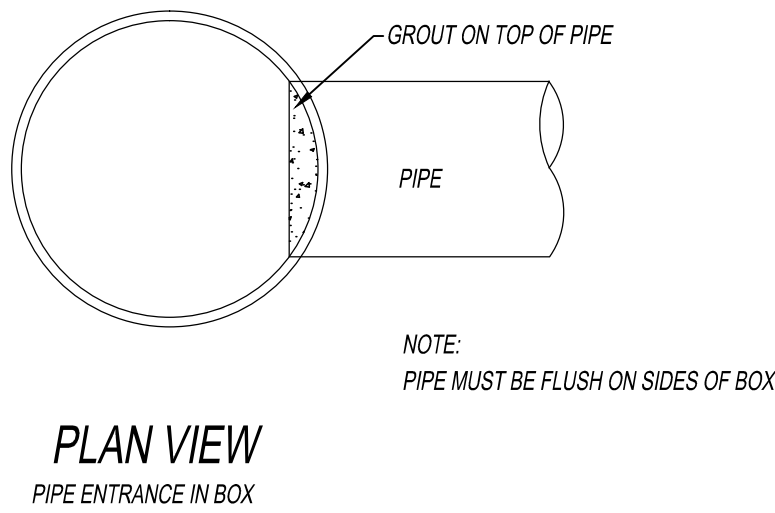
NTS

HEADWALL DETAIL



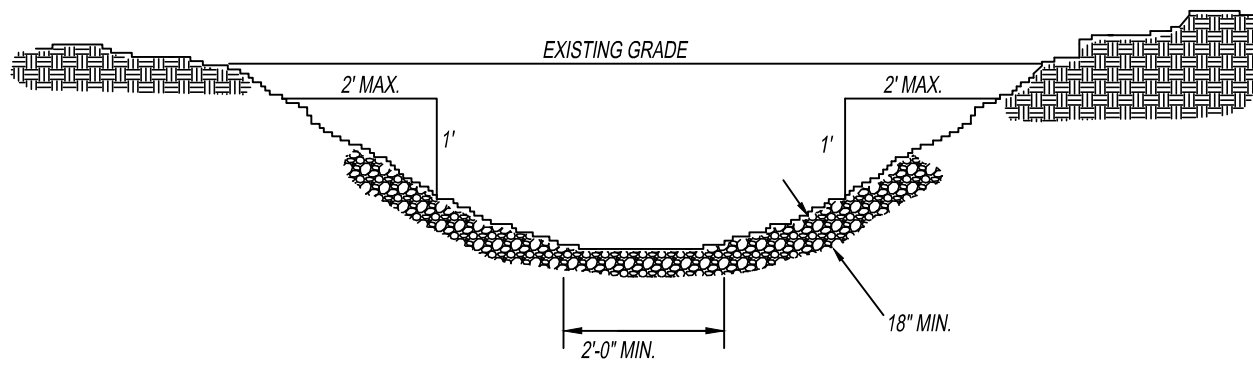
NTS

BEVELLED PIPE



NTS

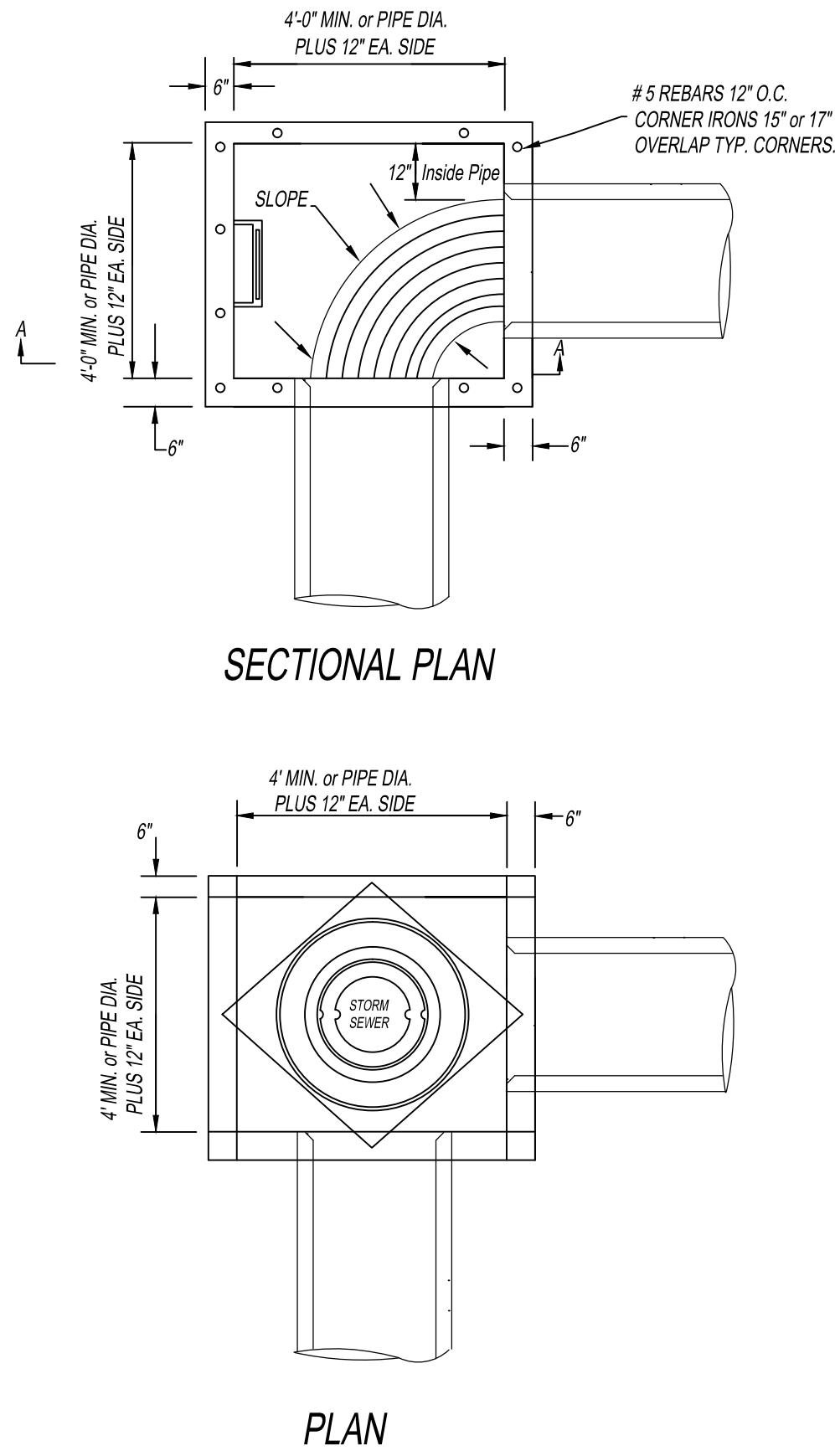
RIPRAP DITCH SECTION



PIPE SIZE	BOTTOM WIDTH
15 IN	2 FT
18 IN	2 FT
24 IN	3 FT
30 IN	3 FT
36 IN	4 FT
42 IN	4 FT
48 IN	5 FT
54 IN	5 FT
60 IN	6 FT
72 IN	7 FT

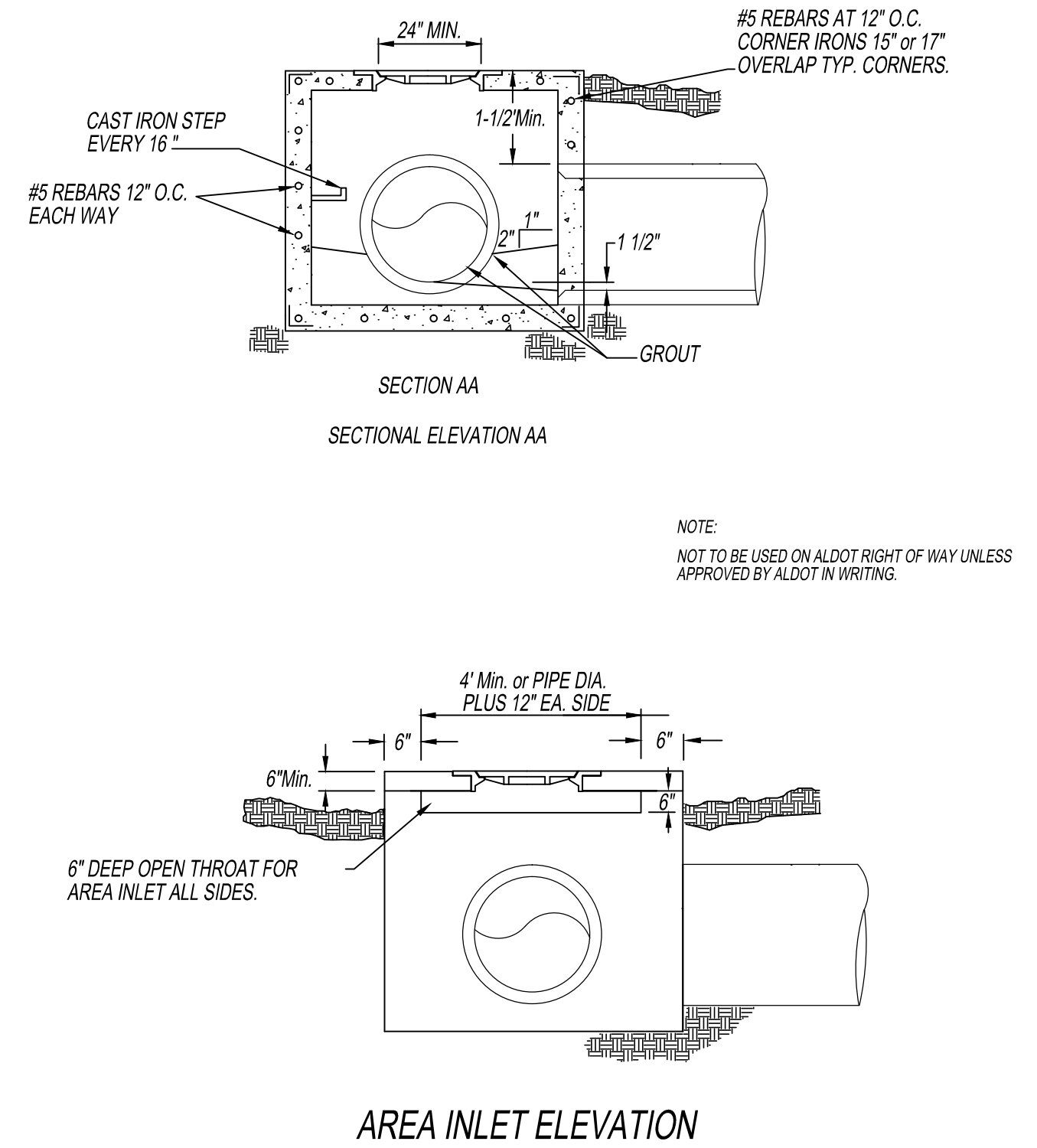
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JUNCTION BOX DETAIL



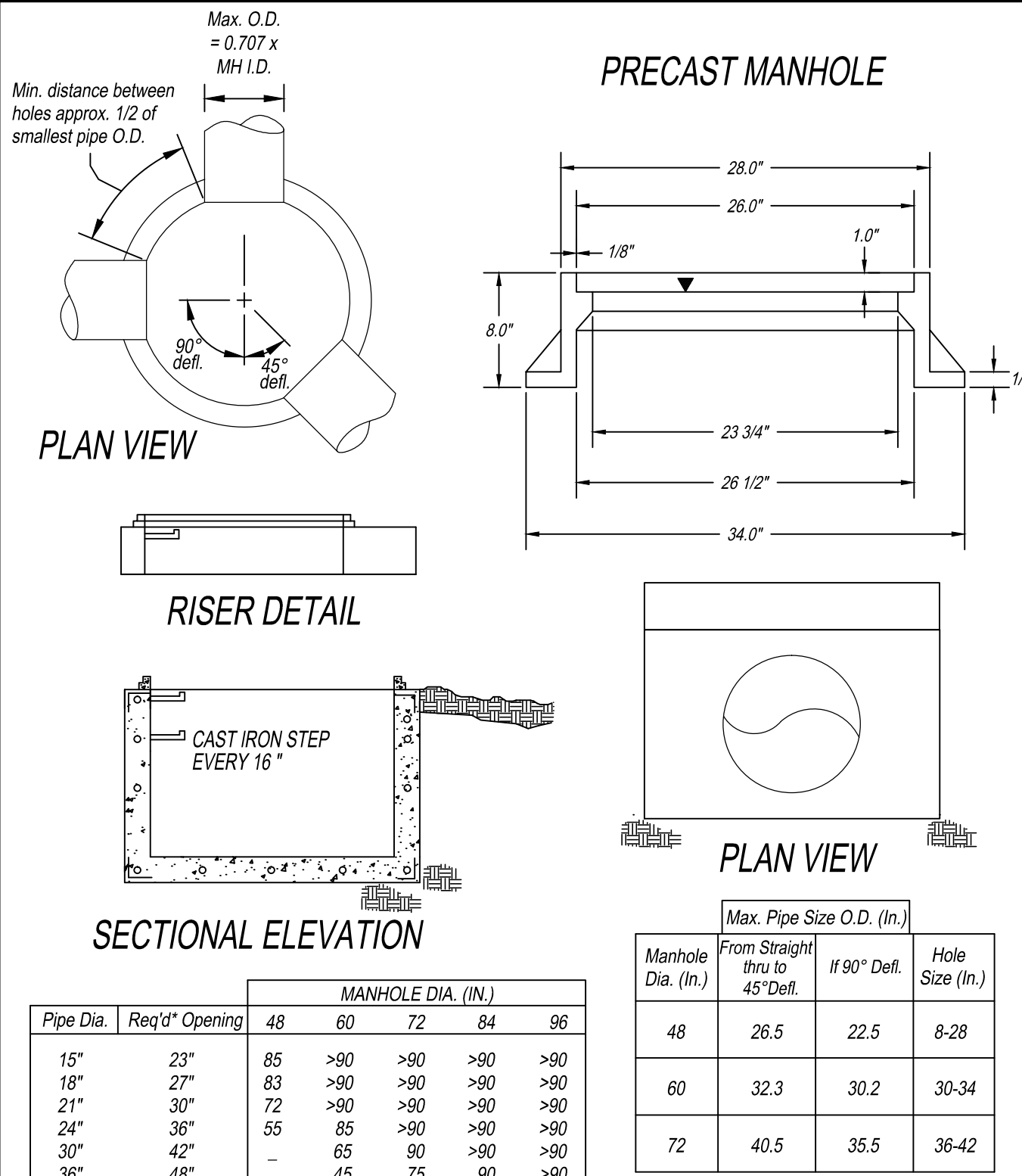
NTS

AREA INLET/JUNCTION BOX ELEVATION



NTS

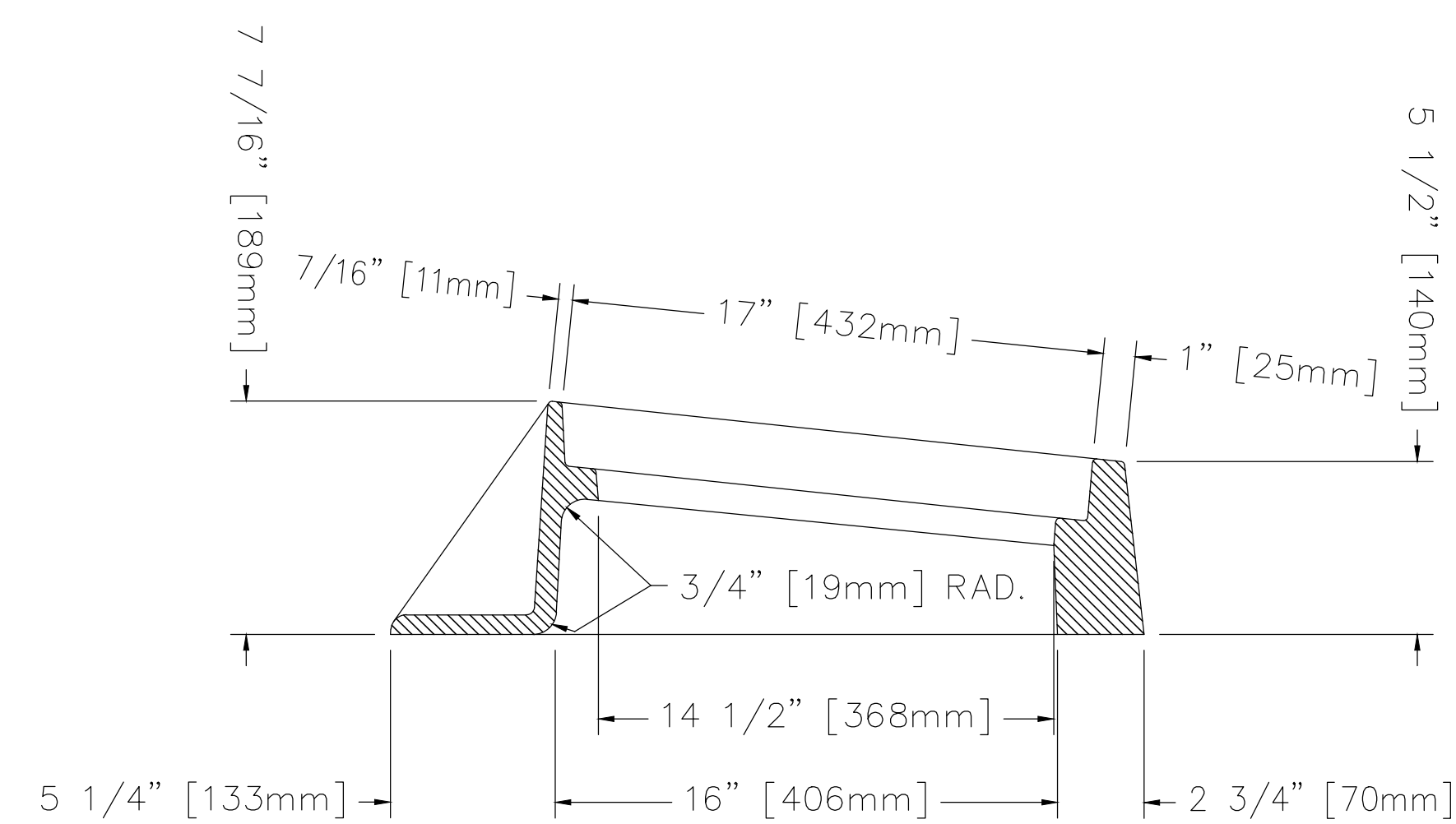
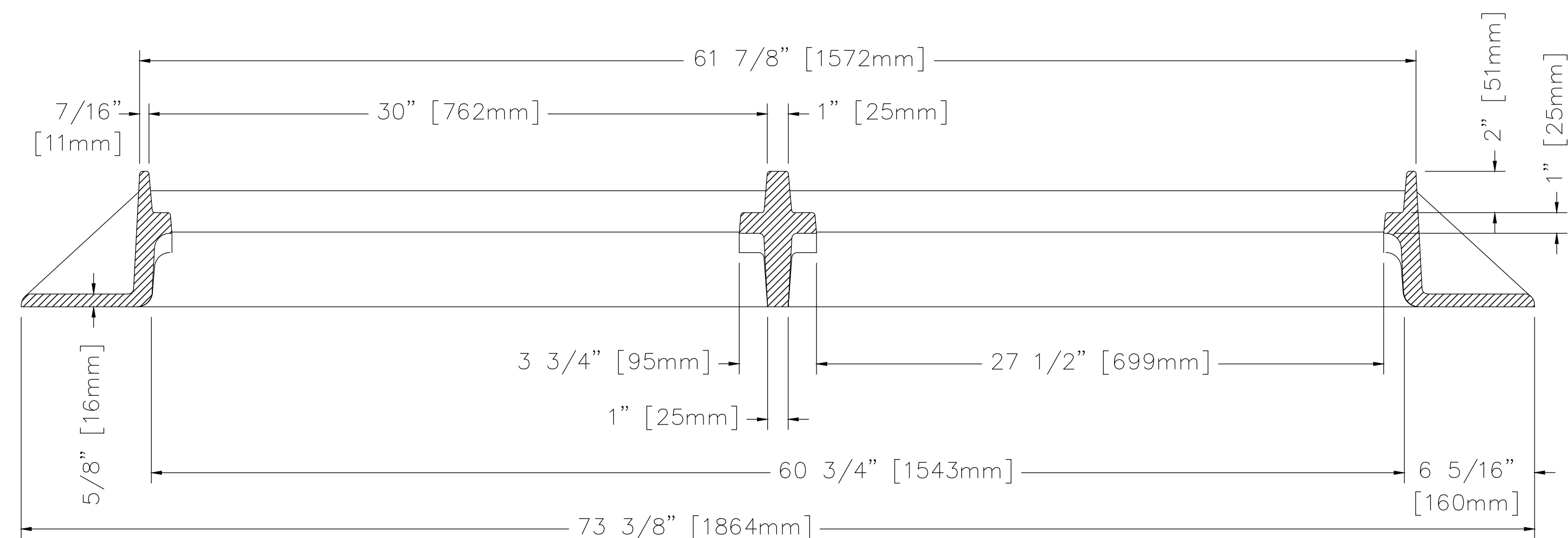
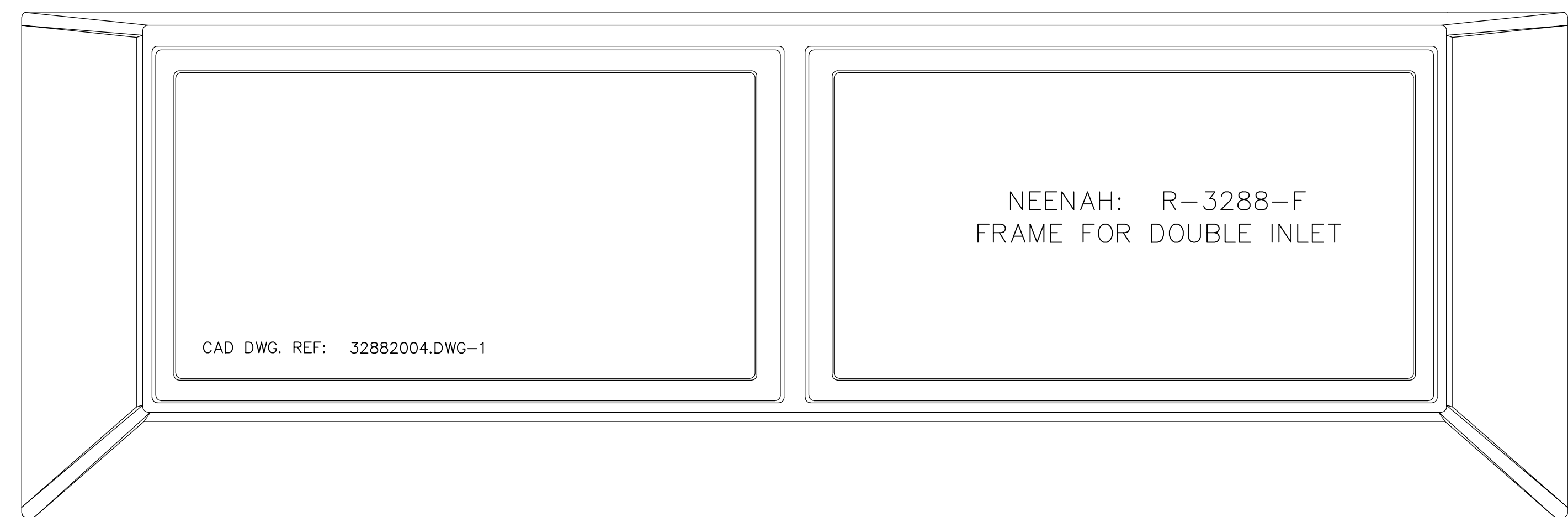
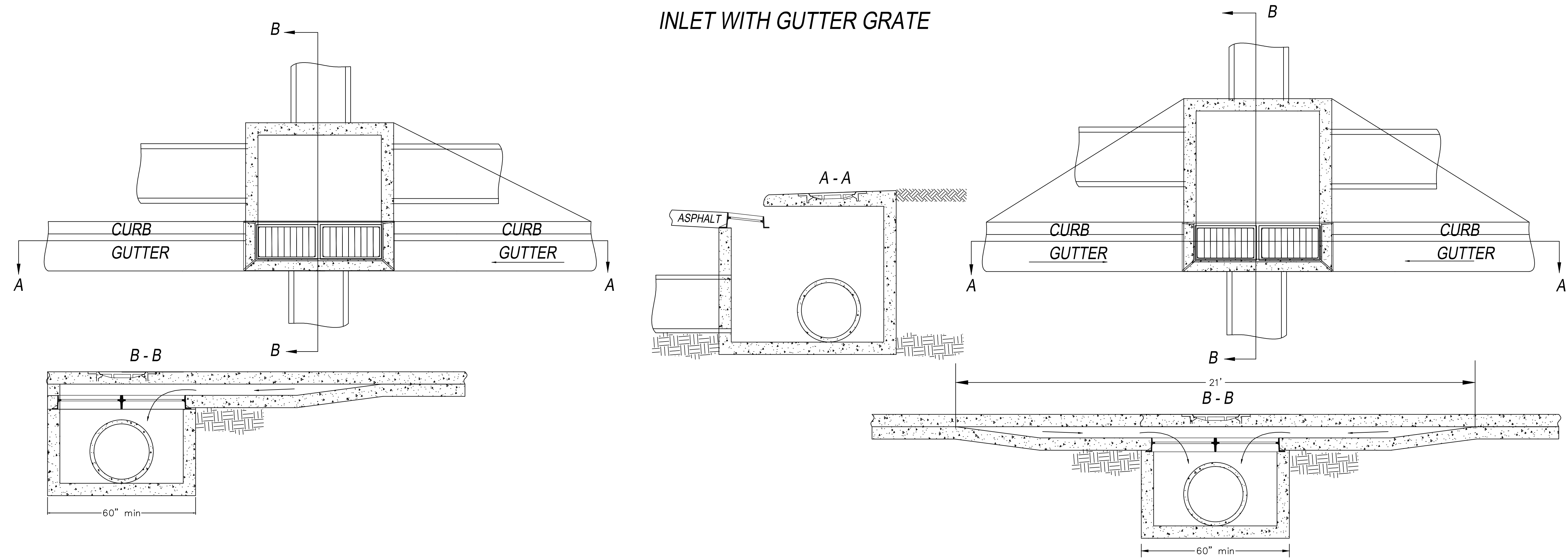
PRECAST MANHOLE



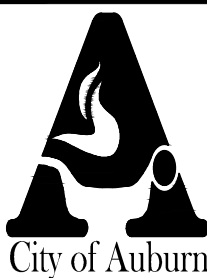
STANDARD DETAILS: STORM SEWER SHEET NO 2 of 3

PROJECT TITLE:	DEPARTMENT:	ENGINEERING:	REVISIONS:
	NTS	BS 8-28-97	BS 4-7-09
	DRAWN BY:	BRIAN SIMPSON	GM 3-09-09
	CITY ENGINEER:	JEFF RAMSEY	GM 05-21-04
	APPROV. BY:	JEFF RAMSEY	GM 10-06-04
	IMPLEMENTED:	JANUARY 01, 2011	

INLET WITH GUTTER GRATE



NOTE: ALL DIMENSIONS ARE SHOWN IN ENGLISH AND [METRIC].  
MATERIAL: CAST GRAY IRON ASTM A-48, CLASS 35B  
FINISH: NOT PAINTED  
WEIGHT: 531#

STANDARD DETAILS: STORM SEWER SHEET NO 3 of 3			
PROJECT TITLE:	DEPARTMENT:	ENGINEERING	REVISIONS:
 City of Auburn	SCALE:	NTS	BS 8-23-07
	DRAWN BY:	BRIAN SIMPSON	GM: 12/28/2010
	CITY ENGINEER:	JEFF RAMSEY	
	APPROVED BY:	JEFF RAMSEY	
IMPLEMENTED:		JANUARY 01, 2011	